

**CLAIMS**

1. A glass reinforcing yarn, the composition of which essentially comprises  
5 the following constituents, within the limits defined below, expressed in  
percentages by weight:

	SiO <sub>2</sub>	50 - 65%
	Al <sub>2</sub> O <sub>3</sub>	12 - 20%
	CaO	13 - 16%
10	MgO	6 - 12%
	B <sub>2</sub> O <sub>3</sub>	0 - 3%
	TiO <sub>2</sub>	0 - 3%
	Na <sub>2</sub> O + K <sub>2</sub> O	< 2%
	F <sub>2</sub>	0 - 1%
15	Fe <sub>2</sub> O <sub>3</sub>	< 1%.

2. The glass yarn as claimed in claim 1, characterized in that the composition  
has an MgO + Al<sub>2</sub>O<sub>3</sub> content of greater than 24%.

3. The glass yarn as claimed in either of claims 1 and 2, characterized in that  
the composition has an SiO<sub>2</sub> + Al<sub>2</sub>O<sub>3</sub> content of greater than or equal to 70%.

20 4. The glass yarn as claimed in one of claims 1 to 3, characterized in that the  
composition has an Al<sub>2</sub>O<sub>3</sub>/(Al<sub>2</sub>O<sub>3</sub>+CaO+MgO) weight ratio that varies from 0.40 to  
0.44 and is preferably less than 0.42.

5. The glass yarn as claimed in one of claims 1 to 4, characterized in that the  
composition has a CaO/MgO weight ratio of greater than or equal to 1.40 and  
25 preferably less than or equal to 1.8.

6. The glass yarn as claimed in one of claims 1 to 5, characterized in that the  
composition essentially comprises the following constituents:

	SiO <sub>2</sub>	56 - 61%
	Al <sub>2</sub> O <sub>3</sub>	14 - 18%
30	CaO	13 - 16%
	MgO	8 - 10%
	B <sub>2</sub> O <sub>3</sub>	0 - 2%
	TiO <sub>2</sub>	0 - 2%
	Na <sub>2</sub> O + K <sub>2</sub> O	< 0.8%
35	F <sub>2</sub>	0 - 1%.

$\text{Fe}_2\text{O}_3$  , < 0.8%.

7. A composite consisting of glass yarns and one or more organic and/or inorganic materials, characterized in that it comprises glass yarns as defined by one of claims 1 to 6.

5 8. A glass composition suitable for producing glass reinforcing yarns, which essentially comprises the following constituents, within the limits defined below, expressed in percentages by weight:

	$\text{SiO}_2$	50 - 65%
	$\text{Al}_2\text{O}_3$	12 - 20%
10	$\text{CaO}$	13 - 16%
	$\text{MgO}$	6 - 12%
	$\text{B}_2\text{O}_3$	0 - 3%
	$\text{TiO}_2$	0 - 3%
	$\text{Na}_2\text{O} + \text{K}_2\text{O}$	< 2%
15	$\text{F}_2$	0 - 1%
	$\text{Fe}_2\text{O}_3$	< 1%.